## Item #1:

Quantity Required – 1 EA

## **Brand Name or Equal Brand Acceptable**

Prosoft MVI56E-MNETC multi-client / server Modbus TCP/IP , module designed to install into an Allen Bradley Contrologics Programmable Logic Controller Rack. The card shall meet the following specifications:

- Single-Slot 1756 ControlLogix backplane compatible
- 10/100 Mbps auto crossover detection Ethernet configuration and application port
- User-definable module data memory mapping of up to 5000, 16-bit registers
- CIPconnect-enabled network configuration and diagnostics monitoring using ControlLogix 1756-ENXT and 1756-CNB modules and EtherNet/IP pass-through communication
- ProSoft Configuration Builder (PCB) software supported, a Windows-based graphical user interface providing simple product and network configuration
- Simple ladder logic and Add-On Instructions (AOI) are used for data transfer between module and processor
- Internal web server provides access to product documentation, module status, diagnostics, and firmware updates
- 4-character, alpha-numeric, scrolling LED display of status and diagnostics data in plain English no cryptic error or alarm codes to decipher
- ProSoft Discovery Service (PDS) software used to locate the module on the network and assign temporary IP address
- Personality Module a non-volatile industrial-grade Compact Flash (CF)card used to store network and module configuration, allowing quick in-the-field product replacement by transferring the CF card

Item #2:

Quantity Required – 15 EA

## **Brand Name or Equal Brand Acceptable**

Niobarra R&D SERI-T Module. Symax Ethernet remote interface module designed to replace the CPU or RI in a Symax Programmable Logic Controller rack and map the rack Input / Output to Modbus / TCP.

Standard SY/MAX register module; 1.5" wide by 13" tall by 6.5" deep.

Power Requirements From SY/MAX bus 0.5 volts, 0.8 A.

Keyswitch Three-position keyswitch (Run, Run/Program, and Halt) on front panel to lock out changes when configured.

Ethernet Port 10BaseT twisted pair Ethernet. Link and Collision indicators on module front panel. Modbus/TCP and HTTP protocols.

Serial Port SY/MAX compatible RS-422 with same pinout as SY/MAX processor; DB9 female connector with slide lock posts. 9600 baud, even parity, SY/MAX or Modbus/RTU; diagnostics, configuration, and firmware updates only.

Indicators Power, Run, Program, Memory Error, I/O Error, Outputs Disabled, Configuration Error, Ethernet

Error (all on top panel). Transmit and Receive indicators for serial port. Transmit, Receive, Link, and Collision indicators for Ethernet, on bottom of front panel. Fourteen indicators total.

Setup Registers Processor equivalent registers store the configuration of the unit. These registers are maintained by rack power when present. Setup is restored from Flash memory after power cycle.

Operating Conditions from 0 to 60 Celsius operating temperature; -40 to 80 Celsius storage. Humidity up to 90 percent noncondensing.